

(2) The Class II gaming system component or other progressive controller must provide a means of creating a progressive balancing report for each progressive link it controls. At a minimum, that report must provide balancing of the changes of the progressive amount, including progressive prizes won, for all participating player interfaces versus current progressive amount(s), plus progressive prizes. In addition, the report must account for, and not be made inaccurate by, unusual events such as:

- (i) Class II gaming system critical memory clears;
- (ii) Modification, alteration, or deletion of progressive prizes;
- (iii) Offline equipment; or
- (iv) Multiple site progressive prizes.

(k) *Critical memory.* (1) Critical memory may be located anywhere within the Class II gaming system. Critical memory is any memory that maintains any of the following data:

- (i) Accounting data;
- (ii) Current credits;
- (iii) Configuration data;
- (iv) Last game play recall information required by paragraph (d) of this section;
- (v) Game play recall information for the current game play, if incomplete;
- (vi) Software state (the last normal state software was in before interruption);
- (vii) RNG seed(s), if necessary for maintaining integrity;
- (viii) Encryption keys, if necessary for maintaining integrity;
- (ix) Progressive prize parameters and current values;
- (x) The five most recent financial instruments accepted by type, excluding coins and tokens;
- (xi) The five most recent financial instruments dispensed by type, excluding coins and tokens; and
- (xii) The five most recent cashless transactions paid and the five most recent cashless transactions accepted.

(2) Critical memory must be maintained using a methodology that enables errors to be identified and acted upon. All accounting and recall functions must be verified as necessary to ensure their ongoing integrity.

(3) The validity of affected data stored in critical memory must be

checked after each of the following events:

- (i) Every restart;
- (ii) Each attendant paid win;
- (iii) Each attendant paid progressive win;
- (iv) Each sensed door closure; and
- (v) Every reconfiguration, download, or change of prize schedule or denomination requiring operator intervention or action.

(1) *Secured access.* Class II gaming systems that use a logon or other means of secured access must include a user account lockout after a predetermined number of consecutive failed attempts to access the Class II gaming system.

§ 547.9 What are the minimum technical standards for Class II gaming system accounting functions?

(a) *Required accounting data.* The following minimum accounting data, however named, must be maintained by the Class II gaming system:

(1) Amount In: The total value of all financial instruments and cashless transactions accepted by the Class II gaming system. Each type of financial instrument accepted by the Class II gaming system must be tracked independently per financial instrument acceptor, and as required by applicable requirements of TGRA regulations that meet or exceed the minimum internal control standards at 25 CFR part 543.

(2) Amount Out: The total value of all financial instruments and cashless transactions paid by the Class II gaming system, plus the total value of attendant pay. Each type of financial instrument paid by the Class II Gaming System must be tracked independently per financial instrument dispenser, and as required by applicable requirements of TGRA regulations that meet or exceed the minimum internal control standards at 25 CFR part 543.

(b) *Accounting data storage.* If the Class II gaming system electronically maintains accounting data:

(1) Accounting data must be stored with at least eight decimal digits.

(2) Credit balances must have sufficient digits to accommodate the design of the game.

(3) Accounting data displayed to the player may be incremented or decremented using visual effects, but the internal storage of this data must be immediately updated in full.

(4) Accounting data must be updated upon the occurrence of the relevant accounting event.

(5) Modifications to accounting data must be recorded, including the identity of the person(s) making the modifications, and be reportable by the Class II gaming system.

(c) *Rollover*. Accounting data that rolls over to zero must not corrupt data.

(d) *Credit balance display and function*.

(1) Any credit balance maintained at the player interface must be prominently displayed at all times except:

(i) In audit, configuration, recall and test modes; or

(ii) Temporarily, during entertaining displays of game results.

(2) Progressive prizes may be added to the player's credit balance provided that:

(i) The player credit balance is maintained in dollars and cents;

(ii) The progressive accounting data is incremented in number of credits; or

(iii) The prize in dollars and cents is converted to player credits or transferred to the player's credit balance in a manner that does not mislead the player or cause accounting imbalances.

(3) If the player credit balance displays in credits, but the actual balance includes fractional credits, the Class II gaming system must display the fractional credit when the player credit balance drops below one credit.

§ 547.10 What are the minimum standards for Class II gaming system critical events?

(a) *Fault events*. (1) The following are fault events that must be capable of being recorded by the Class II gaming system:

Event	Definition and action to be taken
(i) Component fault.	Reported when a fault on a component is detected. When possible, this event message should indicate what the nature of the fault is.
(ii) Financial storage component full.	Reported when a financial instrument acceptor or dispenser includes storage, and it becomes full. This event message must indicate what financial storage component is full.

Event	Definition and action to be taken
(iii) Financial output component empty.	Reported when a financial instrument dispenser is empty. The event message must indicate which financial output component is affected, and whether it is empty.
(iv) Financial component fault.	Reported when an occurrence on a financial component results in a known fault state.
(v) Critical memory error.	Some critical memory error has occurred. When a non-correctable critical memory error has occurred, the data on the Class II gaming system component can no longer be considered reliable. Accordingly, any game play on the affected component must cease immediately, and an appropriate message must be displayed, if possible.
(vi) Progressive communication fault.	If applicable; when communications with a progressive controller component is in a known fault state.
(vii) Program storage medium fault.	The software has failed its own internal security check or the medium itself has some fault. Any game play on the affected component must cease immediately, and an appropriate message must be displayed, if possible.

(2) The occurrence of any event identified in paragraph (a)(1) of this section must be recorded.

(3) Upon clearing any event identified in paragraph (a)(1) of this section, the Class II gaming system must:

(i) Record that the fault condition has been cleared;

(ii) Ensure the integrity of all related accounting data; and

(iii) In the case of a malfunction, return a player's purchase or wager according to the rules of the game.

(b) *Door open/close events*. (1) In addition to the requirements of paragraph (a)(1) of this section, the Class II gaming system must perform the following for any component affected by any sensed door open event:

(i) Indicate that the state of a sensed door changes from closed to open or opened to closed;

(ii) Disable all financial instrument acceptance, unless a test mode is entered;

(iii) Disable game play on the affected player interface;

(iv) Disable player inputs on the affected player interface, unless test mode is entered; and

(v) Disable all financial instrument disbursement, unless a test mode is entered.

(2) The Class II gaming system may return the component to a ready to